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Attorney Docket No. 0553-0402

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In Re Application of:

Satoshi SEO et al

Serial No.: 10/809,130

Filed: March 25, 2004

Art Unit: 1614

For: ORGANIC-INORGANIC HYBRID MATERIAL,
COMPONENT FOR SYNTHESIZING THE SAME, AND
MANUFACTURING METHOD OF THE SAME

) I hereby certify that this correspondence
) is being deposited with the United States
) Postal Service as first class mail in an
) envelope addressed to:
) Commissioner for Patents, P.O. Box 1450,
) Alexandria, VA 22313-1450, on Oct. 7,
) 2005

Cristie M. Noll

Date: October 7, 2005

INFORMATION DISCLOSURE STATEMENT

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Dear Sir:

Pursuant to 37 C.F.R. §1.97, as revised on February 4, 1992, 1135 OG 23-24, Applicant hereby calls the Examiner's attention to documents listed on the attached form, which documents may be material to the examination of this application. Pursuant to 37 CFR §1.98(a)(2)(i) copies of cited US patent and US patent application publications are not submitted herewith. Copies of foreign patent documents and non-patent literature documents are enclosed herewith for the Examiner's consideration.

The family of JP 06-033050 cited herein includes:
US patent no. 5,432,014

The family of JP 2003-077661 cited herein includes:
US patent application publication no. US 2002/0197393 A1

No inference should be drawn that the attached list sets forth a comprehensive investigation of the prior art, that any or all are pertinent to the invention, or that any apparatus disclosed is equivalent to the subject invention.

The citation of the above-discussed documents is not to be construed as an assertion that more pertinent art could not possibly be in existence. Citation of any document herein is not to be construed as an admission that any subject matter disclosed in the document is necessarily within the inventive field of endeavor, that any disclosure is necessarily prior in time to a particular date which may be relevant to the instant patent application, and/or that any disclosure is otherwise necessarily prior art with respect to the instant invention.

Applicant also respectfully reserves the right to later set forth how the instant invention is distinguished over the disclosure of any document or other art, including the disclosure of those documents discussed herein, that may be cited by the Examiner in rejecting a claim in the instant patent application.

The references submitted herewith on 1449 form #1 were cited in an international search report in related PCT application no. PCT/JP2003/003610, which shares the same priority as the present case. The documents submitted herewith on 1449 form #2 are cited and/or referenced within the specification of the present case.

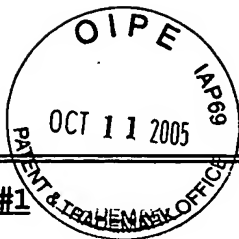
A first office action, notice of allowance or issue fee notification has not been received in this case, so Applicant does not believe that a fee is due. However, if any such fee is required, please charge our Deposit Account No. 50/1039.

Respectfully submitted,



Mark J. Murphy
Registration No: 34,225

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|--|---------------------------------------|---------------------------------|
| FORM #1 LIST OF PUBLICATIONS CITED BY APPLICANT | <u>Atty Docket No.</u> 0553-0402 | <u>Serial No.</u> 10/809,130 |
| | <u>Applicant</u> Satoshi SEO et al | |
| | <u>Filing Date</u> March 25, 2004 | <u>Group</u> 1614 |

U.S. PATENT DOCUMENTS

| *EXAMINER INITIAL | DOCUMENT NUMBER | DATE | NAME | CLASS | SUB- CLASS | FILING DATE |
|----------------------|-------------------------------------|----------------------|------------------------|------------|---------------|----------------------|
| | 5,432,014 US 2002/ 0197393 A1 | 07/11/95 12/26/02 | Sano et al Kuwabara | 428 427 | 690 66 | 11/25/92 06/04/02 |

FOREIGN PATENT DOCUMENTS

| | DOCUMENT NUMBER | DATE | APPLICANT | English Abstract | English Trans. | FILING DATE |
|--|--------------------|----------|--------------------------------------|---------------------|-------------------|----------------|
| | JP 06-033050 | 02/08/94 | Sanyo Electric Co | X | | 11/25/92 |
| | JP 09-102628 | 04/15/97 | Toray Ind. Inc. | X | | 10/04/95 |
| | JP 09-279135 | 10/28/97 | Toyota Central Res & Dev Lab Inc. | X | | 04/17/96 |
| | JP 10-259095 | 09/29/98 | Kaneko Kenzai KK | X | | 03/18/97 |
| | JP 11-031588 | 02/02/99 | NEC Corp. | X | | 07/11/97 |
| | JP 11-273861 | 10/08/99 | Asahi Glass Co Ltd | X | | 03/24/98 |
| | JP 2000- 306669 | 11/02/00 | Canon Inc. | X | | 04/20/99 |
| | JP 2003- 073387 | 03/12/03 | Canon Inc. | X | | 09/04/01 |
| | JP 2003- 077661 | 03/14/03 | Semiconductor Energy Lab Co Ltd. | X | | 06/07/02 |

OTHER PRIOR ART - NON PATENT LITERATURE DOCUMENTS

(Include name of author (in CAPITAL LETTERS), title of article or item (book, magazine, journal, serial, symposium, catalog, etc.) date, pages(s), volume-issue number(s), publisher, city and/or country where published).

| |
|---|
| 1) International Search Report re application no. PCT/JP2004/003610, dated June 22, 2004 (in Japanese). 2) Written Opinion re application no. PCT/JP2004/003610, dated June 22, 2004 (with partial translation). |
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| EXAMINER: | DATE CONSIDERED: |
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*EXAMINER: Initial if citation considered, whether or not citation is in conformance with MPEP form. Draw line through citation if not in conformance and not considered. Include a copy of this form with the next communication to applicant.

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|--|--------------------|----------|---------------------------------------|---------------------|---------------------------------|----------------|
| FORM #2 LIST OF PUBLICATIONS CITED BY APPLICANT | | | <u>Atty Docket No.</u> 0553-0402 | | <u>Serial No.</u> 10/809,130 | |
| | | | <u>Applicant</u> Satoshi SEO et al | | | |
| | | | <u>Filing Date</u> March 25, 2004 | | <u>Group</u> 1614 | |
| U.S. PATENT DOCUMENTS | | | | | | |
| *EXAMINER INITIAL | DOCUMENT NUMBER | DATE | NAME | CLASS | SUB- CLASS | FILING DATE |
| | | | | | | |
| FOREIGN PATENT DOCUMENTS | | | | | | |
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| | JP 06-166501 | 06/14/94 | Diacel Chem Ind Ltd. | X | | 11/30/92 |
| | JP 11-263615 | 09/28/99 | Chugoku Marine Paints Ltd. | X | | 03/13/98 |
| | JP 2002- 212422 | 07/31/02 | Toyota Motor Corp. | X | | 01/17/01 |

OTHER PRIOR ART - NON PATENT LITERATURE DOCUMENTS

(Include name of author (in CAPITAL LETTERS), title of article or item (book, magazine, journal, serial, symposium, catalog, etc.) date, pages(s), volume-issue number(s), publisher, city and/or country where published).

- 1) SANCHEZ, C. et al, "Chemical Modification of Alkoxide Precursors," Journal of Non-Crystalline Solids, vol. 100, pp. 65-76 (1988).
- 2) SAKKA, S., "Science of Sol-Gel Method," Agune Shouhuhu, Tokyo, pp.4-8 (1988)/with concise statement.
- 3) SHINMOU, K. et al, "Fine-Patterning of ZrO₂ Thin Films by the Photolysis of Chemically Modified Gel Films," Japanese Journal of Applied Physics, vol. 33, part 2, no. 8B, pp. L 1181- L 1184 (1994).
- 4) ERA, M. et al, "Organic-Inorganic Heterostructure Electroluminescent Device Using a Layered Perovskite Semiconductor (C₆H₅C₂H₄NH₃)₂PbI₄," Applied Physics Letters, vol. 65, no. 6, pp. 676-678, August 8, (1994).
- 5) WEN, J. et al, "Organic/Inorganic Hybrid Network Materials by the Sol-Gel Approach," Chem Mater, vol. 8, no. 8, pp. 1667-1681 (1996).
- 6) YAMADA, N. et al, "Synthesis and Dynamic Mechanical Behaviour of Inorganic-Organic Hybrids Containing Various Inorganic Components," J. Mater Chem., vol. 7, no. 8, pp. 1491-1495 (1997).
- 7) DANTAS DE MORAIS, T. et al, "Hybrid Organic-Inorganic Light-Emitting Diodes," Adv. Mater, vol. 11, no. 2, pp. 107-112 (1999).
- 8) Section 4 Optical Material Relation: "Manufacture and Application of Organic-Inorganic Composite Coating Thin Film," Organic-Inorganic Hybrid Material (Technical Data Collections) Technical Information Institute Co., Ltd., pp. 208-215, July 30, (1999)/with full English translation, pp. 1-11.
- 9) SCHNEIDER, M. et al, "Novel Electroluminescent Devices Based on Perylene-Doped Sol-Gel Layers," Adv. Mater, vol. 12, no. 5, pp. 351-354 (2000).
- 10) SAKKA, S., Concise Statement re: sol-gel method, Ceramics, vol. 37, no. 3, pp. 136-142 (2002).

EXAMINER:

DATE CONSIDERED:

*EXAMINER: Initial if citation considered, whether or not citation is in conformance with MPEP form. Draw line through citation if not in conformance and not considered. Include a copy of this form with the next communication to applicant.